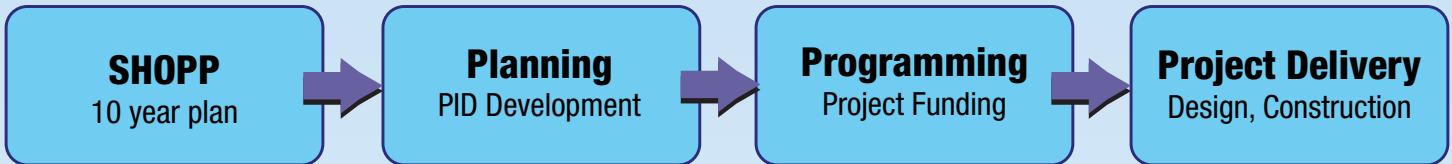


Asset Management

Caltrans Resets Business Model

Existing Project Planning Process



Caltrans is changing the way it manages transportation in California, adopting a mechanism that links the department's goals and objectives to the funding needed to minimize the life-cycle costs for managing and maintaining transportation assets, including roads, bridges, culverts and traffic management elements.

Guided by the 2015-2020 Strategic Management Plan unveiled in March, Caltrans seeks to ensure that every project, every plan, every activity will bring California closer to a safe, sustainable, integrated and efficient transportation system that enhances the state's economy and livability.

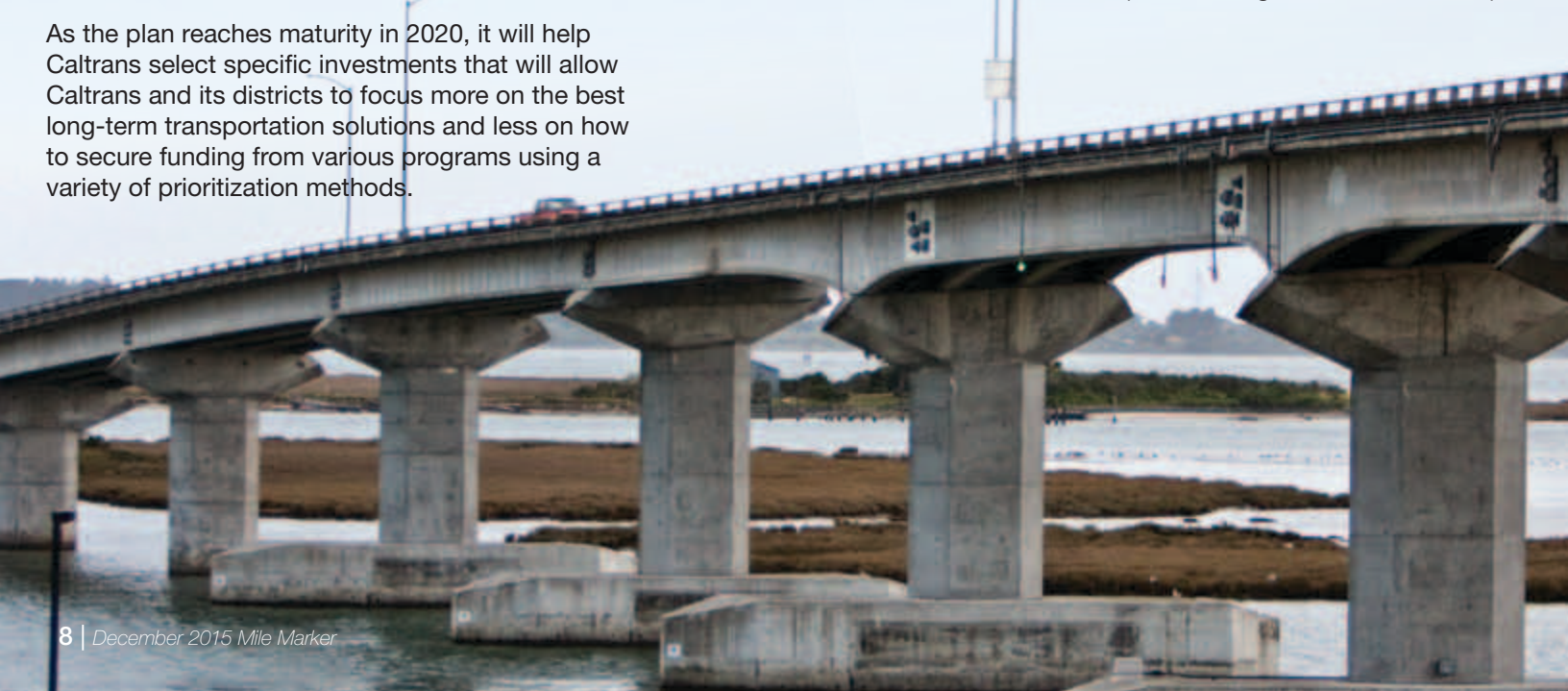
Caltrans is not alone. This new approach – Asset Management – is taking hold in departments of transportation around the country. Asset Management will change how Caltrans plans, funds and prioritizes its projects in measurable ways.

As the plan reaches maturity in 2020, it will help Caltrans select specific investments that will allow Caltrans and its districts to focus more on the best long-term transportation solutions and less on how to secure funding from various programs using a variety of prioritization methods.

Potential savings of this new selection process can be achieved through:

- Lowering project development costs, because what would have been, for example, three separate projects — one for pavement, one for a bridge and another to rebuild a culvert — are now made into one.
- Reinvest savings from efficiencies into more projects.
- Considering/incorporating the transportation needs of all users, including bicyclists, pedestrians and transit users, as well as the movement of freight into preservation, safety and mobility projects.
- Less frequent disruption of traffic, because several pieces of a project can happen simultaneously, rather than be spread out separately over time.
- Creating economies of scale in construction where Caltrans can reap possible cost savings by doing more at once.

*Safety Light Poles installed across
Woodley Island Bridge in Humboldt County.*





The new process is better suited for meeting the transportation needs of all users, including bicyclists, pedestrians and transit riders.

Kicking Off a Pilot Project in Picking Projects

Under this new Asset Management model, projects will be picked according to how they align with Caltrans' mission, vision, goals and objectives such as sustainability, system performance and economy. Projects will no longer be looked at, designed and funded as individual pieces but instead as a sum of pieces that are interconnected and should be treated as a whole system.

Caltrans is running a pilot test process that prioritizes State Highway Operation and Protection Program (SHOPP) projects based on how well each project contributes to the objectives of the Department. The SHOPP is how Caltrans funds its projects along the state highway system that do not add any capacity, such as pavement and structure/bridge rehabilitation. So, a bridge project, for example, must not only span a stream but also provide environmental and sustainability benefits such as possible improvements to a watershed or the addition of a bike or pedestrian lane and ADA-compliant sidewalks. Caltrans has always taken into account conditions and performance of the primary asset involved and strategic objectives in the project but did not typically fund multi-objective projects nor was there a way to define the combined benefit of a multi-objective project.

Each SHOPP project that is nominated for consideration will be evaluated and prioritized against all other competing projects from around the state within the SHOPP. The result of this prioritization will be a clear and transparent presentation of benefits, costs and statewide project ranking, that will be used both internally to manage the SHOPP and externally to communicate what individual projects or a portfolio of projects will accomplish.

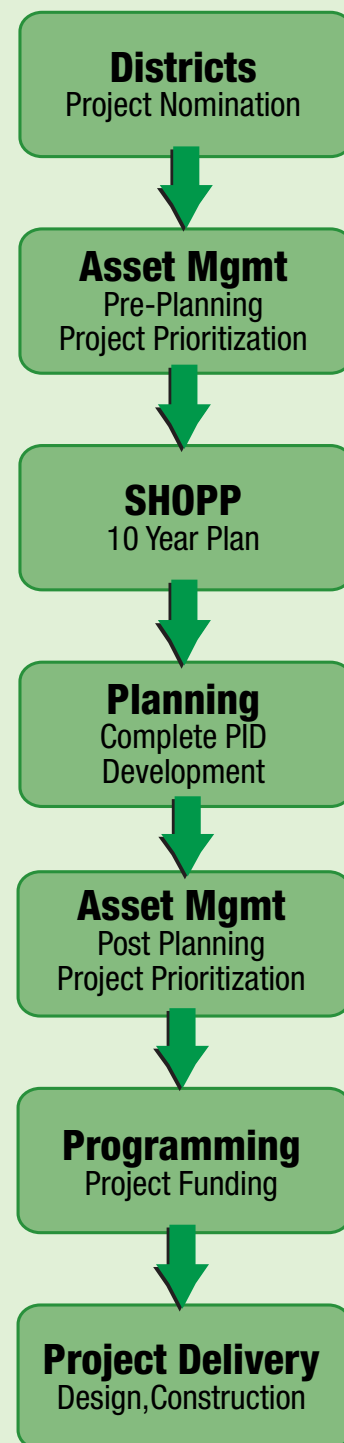
The prioritization will be completely data driven, and will provide a very transparent environment in which projects will compete against each other on a defined set of policies and objectives, all guided by the department's strategic goals. Such data-driven programs will lend themselves well to being integrated into software that will help track costs, inventory, conditions and maintenance throughout the life cycle of the projects.

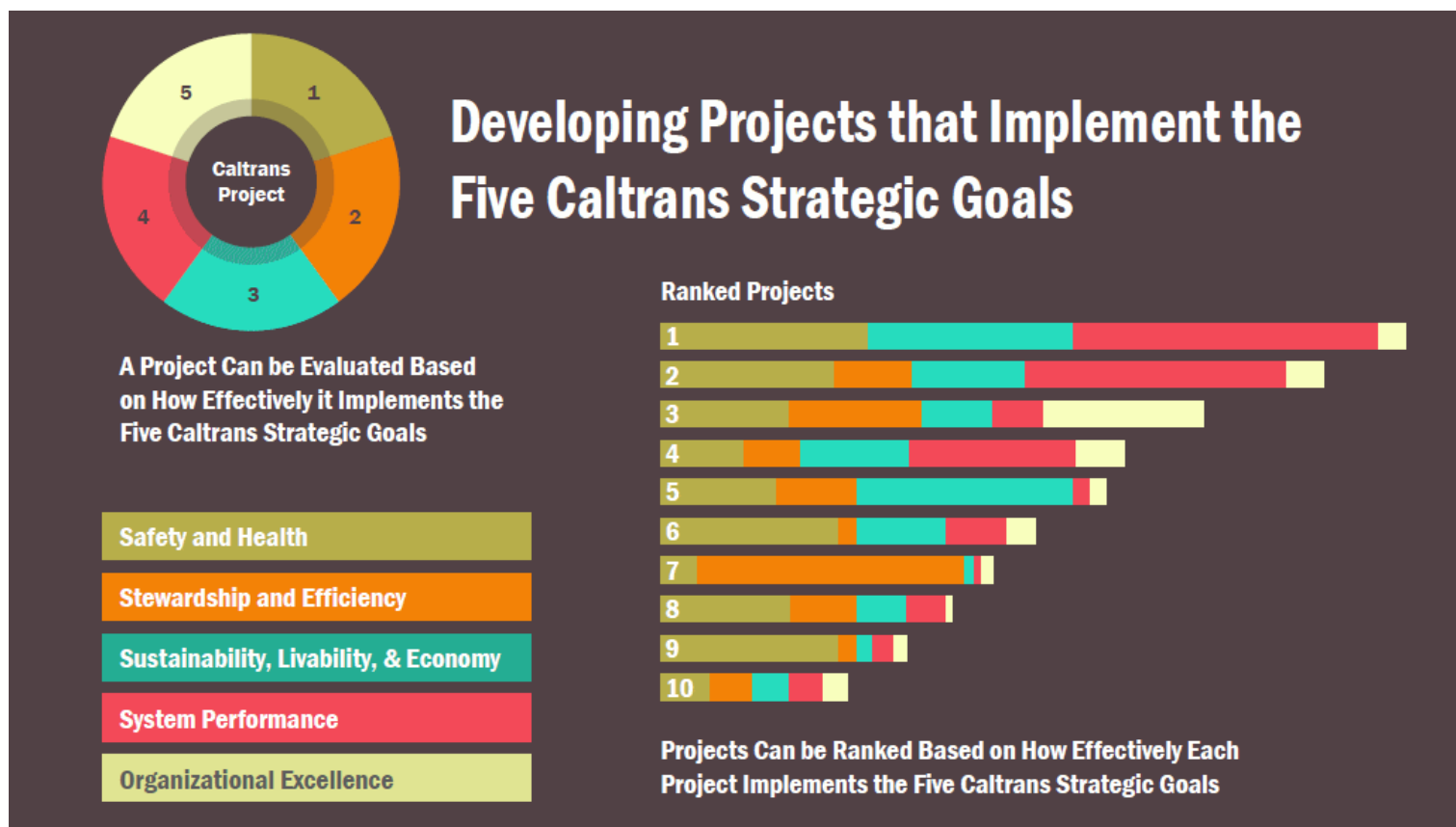
Caltrans will work with its 12 districts, local transportation partners and the California Transportation Commission as it implements this plan.

(continued)

2020 SHOPP Project Planning and Development Process

As the Asset Management plan reaches maturity in 2020, additional steps will be added to the project planning process that will allow Caltrans and its districts to focus more on the best long-term transportation solutions.





New Mandates for Work Already Underway

Several transportation departments around the nation already have similar asset management plans, and California's has been several years in the making.

On the federal level, there is now a federal requirement for asset management under the Moving Ahead for Progress in the 21st Century Act ([MAP-21](#)). MAP-21 requires states to develop an Asset Management plan for the National Highway System by 2018, calling out bridges and pavement in particular.

In July 2012, the Department issued the [Caltrans Program Review](#), which expressed that, among other goals, "Caltrans must be open to restructuring, more dedicated to managing change and be receptive to improvement initiatives that focus on results." One of the specific areas identified to fulfill this goal was asset management. As a result, Caltrans said in its [Program Review Action Plan](#) that the Department will "fully commit to Asset Management of the state highway system infrastructure, with focus on its performance."

Add to this state legislation signed into law in September 2014 codifying that Caltrans must have a robust asset management plan in place to guide project selection before 2020. When complete, this transportation asset management plan will assemble all federal and state requirements into a single strategy that will help guide the development of the SHOPP.

With all this momentum behind asset management, Caltrans also appointed California's first state asset management engineer. This position reports to the chief deputy director and is in charge of coordinating the move to asset management across all divisions of the department. Caltrans will work with its districts, local transportation partners and the California Transportation Commission to ensure continued input as it phases in and implements asset management.

Expect to read more in future *The Mile Marker* issues as Caltrans continues to develop its asset management plan, data plans, software tools and business processes that will help maximize the benefits that California will get from available transportation funding.

Contributor: State Asset Management Engineer, Michael B. Johnson